

1	SPEED RESPONSIVE DEVICE FOR	26	.Including piston axially movable
	ADJUSTING RELATIVE ROTATIONAL		in cylinder having axis
	POSITION OF COUPLED MEMBERS		coextensive with axis of
2	.Actuated by fluid or electricity		rotation of coupled members
3	.Pivoted weight	27	.Including multiple piston-
4	..Gear segment on pivoted weight		cylinder devices radially
5	..Pivotal movement opposed by		spaced from axis of rotation
	compression of coil spring	28	.Fluid confined in enclosure
	along its axis		having flexible walls
6	..Pivotal movement opposed by	29	ELECTRICAL OR MAGNETIC COUPLING
	expansion of coil spring along	30	OVERLOAD RELEASE COUPLING
	its axis	31	.Including thermally responsive
7	HAVING LUBRICATING MEANS		element
8	.Lubricant impregnated into	32	.Torque transmitted via frangible
	material		element
9	..Metallic material	33	..Axially extending pin
10	.For overload release coupling	34	.Torque transmitted via radially
11	.For coupling having torque		spaced deformable roller
	transmitted via radially	35	.Torque transmitted via a ball
	directed pin received in	36	..Axially biased
	conforming aperture	37	.Torque transmitted via
12	..Lubricant supplied to plural		resiliently biased positive
	pins via common ring which		drive connection (e.g., cam
	encapsulates pins		and follower)
13	...Pin includes longitudinally	38	..Axially biased
	extending internal passage	39	...By spring coiled about axis of
14	..Pin includes longitudinally		rotation
	extending internal passage	40	.Torque transmitted via
15	.For coupling having torque		frictional engagement of coil
	transmitted via a ball		spring
16	.For coupling having torque	41	.Torque transmitted via plural
	transmitted via intermeshing		circumferentially spaced
	teeth		friction elements
17	HAVING HEATING OR COOLING MEANS	42	.Torque transmitted via
18	FLEXIBLE COUPLING BETWEEN FLUID-		frictional engagement of
	CONDUCTING ROTARY SHAFTS		conical or frustoconical
	(E.G., COUPLING BETWEEN		surfaces
	SECTIONS OF DRILL STRING,	43	..With separate resilient member
	ETC.)		for biasing surfaces into
19	.Relative angular displacement of		engagement
	axes of shafts	44	...Coil spring
20	.Including member deformable by	45	.Torque transmitted via
	relative movement between		frictional engagement of
	shafts		planar radially extending
21	..Member is coiled spring		surfaces
22	HAVING CLEANING MEANS	46	..With separate resilient member
23	WITH AUXILLIARY INDICATOR OR		for biasing surfaces into
	ALARM		engagement
24	FLUID COUPLING	47	...Coil spring
25	.For transmitting limited	48	....Plural, circumferentially
	pulsating torque (e.g., fluid		spaced coil springs
	drive coupling for impulse		
	tool)		

CLASS 464 ROTARY SHAFTS, GUDGEONS, HOUSINGS, AND FLEXIBLE COUPLINGS FOR ROTARY SHAFTS

49	COUPLING DEVICE INCLUDES ENDLESS CHAIN ENGAGED WITH CIRCUMFERENTIAL TEETH ON COUPLED MEMBERS	68	....Springs positioned between axially spaced plates of one member and driven by other member extending radially between said plates
50	COUPLING DEVICE INCLUDES ANGLED OR HINGED ROD HAVING OPPOSITE ENDS RELATIVELY RECIPROCABLE AXIALLY IN BORES IN SPACED COUPLED MEMBERS	69	.Plural flexible links connected to circumferentially spaced axially directed pins on drive and driven members
51	TORQUE TRANSMITTED VIA FLEXIBLE ELEMENT	70	.Element is annular liner within radially spaced pin-receiving opening
52	.With stationary housing	71	..Axially directed pin
53	..And threaded annulus surrounding terminal end of housing for attachment to auxiliary housing	72	...Plural axially spaced liners
54	.Element coiled sinusoidally about axially spaced driving and driven members	73	.Element positioned between intermeshing teeth on driving and driven members
55	.Element is flaccid and operates in tension during torque transmission (e.g., belt, cable, etc.)	74	..Teeth on radially overlapping surfaces
56	..Element has circular cross section	75	...Element is a continuous annulus extending around rotational axis
57	.Element has plural convolutions wound about rotational axis	76	..Plurality of disparate elements
58	..Plural radially overlapping convoluted elements	77	.Element is an open loop spring curved about rotational axis
59	..Single element has plural radially overlapping convolutions	78	.Element is tube with slot through wall to provide flexibility
60	..Convoluted element has noncircular cross section	79	.Element includes diverging wall portions defining annular groove completely surrounding rotational axis (e.g., bellows)
61	.Element is a spring coiled about centerline angularly related to or radially spaced from rotational axis	80	..Nonmetallic
62	..Plural springs	81	.Plural circumferentially spaced elements
63	...Centerline of springs axially spaced from each other along rotational axis	82	..Extending between radially overlapping surfaces on driving and driven members
64	...Plural superposed springs on common centerline	83	...Nonmetallic
65	...Centerline of springs radially spaced from and parallel to rotational axis	84	..Elements are bowed leaf springs
66	...Opposite ends of spring are equidistant from rotational axis	85	..Nonmetallic
67	....Springs on circumferentially extending curved centerline	86	..Axially extending torsion bars
		87	.Nonmetallic element
		88	..Element is hollow sleeve surrounding rotational axis and connected at opposite ends to axially spaced torque transmitting surfaces on driving and driven members
		89	..Extending between radially overlapping surfaces on driving and driven members

90	...Plural elements radially overlapping	110	.Coupling transmits torque via semicylindrical segments separated by pivot pin (e.g., slipper bearing)
91	...Plural elements axially spaced along rotational axis	111	.Tripod coupling
92	..Annular element between and coincident with drive and driven members	112	.Coupling transmits torque via radially directed pin
93	...Including means to receive radially spaced axially extending projection on drive and driven members	113	..With additional axially spaced torque-transmitting coupling which facilitates relative movement between members
94	....Laminated element or plural elements abutting or spaced along rotational axis	114	...Radially directed pin in each coupling
95	.....With disparate spacer between plural separable elements	115	....Pin slidable axially in slot
96	...Laminated element or plural elements abutting or spaced along axis of rotation	116	.....Axially spaced pin-carrying parts interconnected by pivotal head and socket centering joint
97	.Element is a torsion bar having a longitudinal axis coincident with the rotational axis	117	....Plural pins in each coupling with pin ends spaced 90 degrees apart
98	.Element is plate with external edge completely surrounding rotational axis (e.g., disc)	118	.....Axially spaced pin-carrying parts interconnected by pivotal head and socket centering joint
99	..Plural axially spaced plates	119	...Pins in sequential couplings oriented at right angles to each other
100	.Element is leaf spring	120	..Pin slidable axially in slot
101	..Bowed	121	...Pin carried by intermediate element and slidable axially in slots in both coupled members
102	SEPARATE COUPLING DEVICE MOVABLE RADIALLY OF AXES OF TORQUE TRANSMITTING MEMBERS TO ACCOMMODATE PARALLEL, MISALIGNED AXES (E.G., OLDHAM COUPLING)	122	...Pin carries disparate sleeve engaged with slot walls
103	.Coupling device includes rolling body for transmitting torque	123	....Sleeve rotatable about pin axis
104	.Coupling device has aperture or groove for receiving complementary driving projection on torque transmitting members	124	.....Sleeve has spherical or semi-spherical bearing surface
105	..Projection-receiving slot extends completely through thickness dimension of coupler	125	..Plural pins received in conforming apertures in ring
106	COUPLING ACCOMMODATES DRIVE BETWEEN MEMBERS HAVING MISALIGNED OR ANGULARLY RELATED AXES	126	...Split ring
107	.Coupling between wheel and vertically oriented shaft (e.g., millstone)	127	..With particular balancing means
108	..Wheel mounted on rolling body	128	..With particular bearing cup surrounding pin end
109	.Coupling includes relatively movable gear segments	129	...Spherical or semi-spherical cup
		130	...And disparate device for securing cup to pin or receiver
		131	...And flexible seal
		132	..With particular bearing or bushing mounted on pin
		133	..With particular flexible seal

134	..With particular yoke providing pin-receiving aperture	155	..Intermediate element includes external surface at opposite ends received in complementary openings in axially spaced ends of driving and driven members driven members
135	...Split yoke		
136	..Plural pins carried by intermediate member with pin ends spaced 90 degrees apart	156	...Intermeshing teeth on element and members
137	.Coupling transmits torque via axially directed pin radially spaced from rotational axis	157	.Torque transmitted via intermeshing teeth on drive and driven members
138	..Particular pivotal mounting for pin	158	..Teeth on radially overlapping surfaces
139	.Coupling transmits torque via radially spaced ball	159	...Spherical or semispherical surfaces
140	..With additional axially spaced torque-transmitting coupling which facilitates relative movement between members	160	COUPLING FACILITATES RELATIVE ROTARY DISPLACEMENT BETWEEN COUPLED MEMBERS
141	..Ball mounted in groove for relative axial movement with respect to coupled member	161	.Members coupled via axially movable, resiliently biased intermediate element
142	...Mounted for relative axial movement with respect to both coupled members	162	COUPLING FACILITATES RELATIVE AXIAL MOTION BETWEEN COUPLED MEMBERS
143	....Grooves formed in radially overlapping elements	163	.Coupling between rotary drive table and axially movable drill string
144	.....Intersecting grooves		
145	.....With intermediate positioning cage for ball	164	..Coupler includes endless belt or chain run engageable with drill string and moveable in direction of axial advance
146	.....Bottom wall of groove in outer member is parallel to axial centerline of outer member (e.g., internally grooved cylinder)	165	..Coupler includes antifriction rolling body engageable with drill string
147	.Torque transmitted via intermediate element	166	...With screw device for adjusting radial position of rolling body
148	..Element carries or receives hook on opposite ends for connection to drive and driven members (e.g., link chain)	167	.Coupler includes antifriction rolling body engageable with axially moveable member
149	..Axially intermeshing teeth	168	..Recirculating rolling bodies
150	..Intermediate element located between overlapping surfaces on drive and driven members	169	.Including spring to bias member in axial direction
151	...Intermediate element is externally grooved or ribbed sphere	170	HOUSING
152	...Plural circumferentially spaced intermediate elements	171	.Rigid semispherical surface on one housing part slidably engaged with surface on mating housing part
153	..Intermediate element includes internal openings at opposite ends for receiving axially spaced ends on drive and driven members	172	.Telescoping cylindrical housing members
154	...Intermeshing teeth on element and members	173	.Flexible housing
		174	..Helically coiled member
		175	..Corrugated structure

- 176 .Pivotally mounted housing
supported for movement between
open and closed positions
- 177 .Separably connected housings for
separably connected shafts
- 178 .With rolling body supporting
shaft in housing
- 179 **SHAFTING**
- 180 .Particular vibration dampening
or balancing structure
- 181 .Nonmetallic shaft or component
- 182 .With disparate device for
coupling shaft to additional
shaft or rotary body
- 183 .Hollow or layered shaft
- 184 **GUDGEONS**
- 185 **MISCELLANEOUS**

CROSS-REFERENCE ART COLLECTIONS

- 900 **ELECTRICALLY INSULATIVE MEMBER**
- 901 **RAPID ATTACHMENT OR RELEASE**
- 902 **PARTICULAR MATERIAL**
- 903 .Nonmetal
- 904 **HOMOKINETIC COUPLING**
- 905 .Torque transmitted via radially
extending pin
- 906 .Torque transmitted via radially
spaced balls

FOREIGN ART COLLECTIONS

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